



NATIONWIDE CHILDREN'S
When your child needs a hospital, everything matters.

Helping Hand™

Health Education for Patients and Families

Sports Medicine: Metatarsalgia

Metatarsalgia (met-uh-tahr-sal-juh) refers to pain in the ball of the foot (metatarsal heads). This is the part of the foot where you push off when walking or running. This pain can occur in one or more of the toes. It usually involves the second and third toes. This injury can happen all at once or develop slowly over time and can be related to an increase in jumping, running, or high-impact activity.

Signs and Symptoms

- Pain in the ball of the foot
- Sharp or shooting pain in the toes
- Increased pain with standing, walking, or running
- Pain increases when walking barefoot
- May feel like there is a stone in the shoe

Increased Risk

- Wearing old or poorly fitting shoes
- Wearing high heels or narrow pointed shoes
- Playing sports with high-impact or that involve jumping or running long distances (basketball, soccer, track)
- Overweight
- Toe is deformed (claw, hammer toe, bunion(s))
- Having flat feet or high arches, or having a second toe that is longer than the big toe

Treatment

- Medicine
 - Anti-inflammatory medicines, such as ibuprofen (Motrin® or Advil®) or naproxen (Aleve®), may be recommended. Take these as directed by your doctor or health care provider.
 - Other minor pain relievers, such as acetaminophen (Tylenol®).

- Use of cold and heat
 - Cold should be applied for 10 to 15 minutes every 2 to 3 hours and after any activity that makes symptoms worse. Use ice packs or an ice massage and raise the foot and ankle at or above heart level to reduce swelling.
 - Heat may be used before doing stretching and strengthening activities prescribed by your health care provider or athletic trainer. Use a heat pack or a warm soak. Apply for 10 to 15 minutes.
- Orthopedic aids
 - A stiff-soled shoe and arch support (orthotic) may be used or a metatarsal pad to help take stress off the metatarsal heads.
- Exercises
 - Exercises may be prescribed to increase strength and flexibility in the foot to take pressure off the metatarsals. These may be done at home, or referral to a physical therapist or athletic trainer may be needed.
- Surgery
 - In cases where other treatment may fail, surgery may be needed to move the metatarsal bones.

How to Prevent

- Do correct warm-up and stretching before practice or competition.
- Increase running distance slowly and steadily.
- Wear the correct footwear for all physical activity. You should have good arch support, and correct fit. Shoes should be replaced every 300 to 500 miles for runners.

When to Call the Doctor

Call your doctor, health care provider, or the Sports Medicine team at (614) 355-6000 if:

- Symptoms get worse or do not improve in 2 to 4 weeks, despite treatment.
- New, unexplained symptoms develop.

To schedule an appointment with Sports Medicine, visit [NationwideChildrens.org/SportsMedicineScheduling](https://www.NationwideChildrens.org/SportsMedicineScheduling) or scan this code with your camera phone.

